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Research Article

# An Oral-Based Study on Narrative Geographical Knowledge

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## Abstract

This study aims to determine the geographical discourse that occurs in the personal histories of adults aged 75 years and older and how they interpret and use them. We conducted interviews with elderly persons living in Çemişgezek (Chemishkezek), a village established along the Karasu River, a branch of the Euphrates River. Expert opinions were taken on the duration, number and time of the interviews. Interview texts were analysed after they were read, by the researcher, to the participants, and approved. This information, subjected to content analysis to reveal the grandeur of the themes, was classified and interpreted, according to physical and human geographical characteristics. During analyses, care was taken to make direct quotations and use local phrases and expressions as spoken. Subjects covered in the discourse between researcher and interviewee included astronomy, location determination, finding direction, telling time, climatic elements, settlement location, view of dwellings, materials used for constructing houses, preferred rooms according to the seasons, crop cultivation, tree trimming, leaving land fallow and the use of streams. Geographical arguments, in the discourses that participants put into practice, agree with published geographical information. However, several expressions for stars and sea have fallen into disuse. We discuss these findings by comparing them with the literature.

## Keywords

Narrative method • Oral geography • Geography in personal histories • Geography in narratives • Geographic education

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Humans connect with nature throughout their whole lives. This relationship with nature, although artificial in cities, is felt in a perceptible way in rural areas. The environment affects people living in rural settlements much more than in cities. By using their knowledge and experience, humans try to reduce the negative effects of living in rural areas. These experiences, with the natural environment, have been coded into our oral discourse that has been passed down from generation to generation, never forgotten. Nature itself helps us remember, for example, when settlements, which have been constructed in riverbeds in rural or urban areas, were flooded after torrential rainfall. An expression to describe this natural disaster is the stream finds its way. This is a lesson taught to us by nature.

Geography is a science that examines the relationships between the phenomena on earth, the distribution of these phenomena and the reasons of this distribution (Tanoğlu, 1964, p. 1). In essence, the physical and human events occurring in the world treated in geography with its own methods (Biricik, 2009, p. 3). It describes and explains physical and human characteristics (Rey, 1998). Wherever there is a person, there is geography (Özey, 2010, p. 1). Geography is a science that contains argument, reasoning and cause and effect (Hughes, 1870). Its main purpose is to examine the interaction between human and the environment (Mackinder, 1887). A discipline trying to explain how societies are influenced by the environment in which they live (International Geographical Union, 2017). The study of places, peoples and the environment (Royal Geographical Society, 2017). As societies change, geography also changes. It has connoted rather different things to different people at different times and in different places (Livingstone, 1992). ...to research and study dynamic relationships between humans and the environment (Institute of Australian Geographers, 2017). Studying the ways and methods in which the place is included (Gregory, Johnson, Pratt, Watts, & Whatmore, 2009). Geography is expanding its research field to study the natural, human and economic phenomena in the world by establishing connections with people (Doğanay, 2012, p. 13). Today, the concept of applied geography is highly emphasised with certain developments in geographical thinking (Doğanay, 2012, pp. 35–37). The natural environment hosts humans at the same time that it is influencing and guiding them. As a result, a relationship between humans and their activities and the natural environment emerges. Humans are quite affected by relief, climate, soil, vegetation formation, water and underground sources, and therefore humans should design societal, political, military and technical activities according to the physical characteristics of the natural setting, for example, a country having coast engages mostly in the marine sector; a densely forested country develops its logging industry; a country with large, arable lands engages in agriculture and farming; one with large, powerful rivers engages in energy production; and one with rich natural resources deals with mining activities. Thus, humans and their activities are shaped according to the features of the natural environment. Geography focuses on these relationships systematically (Biricik, 2009, p. 3).

As is known, geography is a science that contains different terms. The terms used in scientific works have different local counterparts in Anatolia. The changes in rural networks have caused local geographic terms to disappear. These terms are living cultural heritage and can disappear gradually if they are not passed down to future generations... Geographical terms shaped local dialects by cultural integration and are a treasure to be explored... It is important to pass down these disappearing terms because they have cultural value to future generations. Primary oral culture is often neglected in social science research. Studies that measure geographical knowledge and explain the role and effects of geographical structure on human life are limited, almost non-existent. Oral discourse is dynamic, and the geographic content within remains shrouded in mystery. Humans and societies live in geographical places, but, in a way, we neglect to uncover the realities that places reflect. People with a fairly high life experience (elderly population) are the primary witnesses of natural and cultural events that take place in their environment since the day that they began to perceive the world. The era in which they lived and the lack of technology made it impossible to record their personal histories. In this context, the details of human-environment interaction, which they lived by, remain recorded in their memory. It is necessary to record spatial testimonies and the perceptions of elderly people, in order to pass them on for use in the education of future generations (Yıldırım & Tarım, 2014, pp. 18–19). Taking into account these types of foresight, the interviews conducted with participants, aged 75 years and older, tried to follow these aims and guidelines.

In geography textbooks, *oral geography* is described as the explanation of human experiences and their relationship with nature, which elderly people have experienced, recorded and coded into their oral language. This knowledge is passed down to future generations: dynamic and shrouded in oral discourse with geographical content (Yıldırım & Tarım, 2014, p. 19), collecting the geographical oral sayings belong to our collective history (İlyasoğlu, 2006, p. 97), recording and analysing geographical oral evidences and documents (Demircioğlu, 2005, p. 310).

Oral geography is a concept that is not often used in Turkish geographic literature: topics such as folk calendars and local dialects are some of the only geographic areas of research actively pursued (Erinç, 1984, Ertüre, 1977; Güner & Şimşek, 1998; Koç, 2001; Koç & Keskin, 2001; Sever, 2005; Tunçdilek, 1967; Yıldırım & Tarım, 2014). English sources place the term *oral geography* under an umbrella heading of the term *narrative* (Berger, 1997; Bullough & Baughman, 1996; Clandinin & Connelly, 1998; Connelly & Clandinin, 1990; Crang, 2003; Edgar & Sedgwick, 1999; Elbaz-Luwisch, 1997; Gregory et al., 2009; Hay, 2004; Henderson & Gregory, 2000; Hones, 2011; Lacey, 2000; Linton, 2001; Maddrell, 2009; McPartland, 1998, 2001; Riessman, 1993; Said, 1990; Summerby-Murray, 2010; Wells, 2011; Wiles, Rosenberg, & Kears, 2005). In these resources, the geographical narratives are as

follows: found useful and its usefulness cited like narrated things are the geography's historical sources, they are potential for geographers to explore, offering thoughts for the quality of geography education, representing the nature, regions and nations, being utilised in teaching, internalising basic concepts, allowing to put theories into practice and being useful examples for constructivist education. There is no mention of oral geography in Turkish sources and dictionaries (ArDOS, 1988; ArDOS & Pekcan Yalçiner, 1997; Atalay, 2004; Güney, 2006; Güney, Bozyiğit, Meydan, Kılıç, & Bulut, 2016; Hoşgören, 2011; İzbirak, 1968; Öngör, 1962; Sanır, 2000; Yalçın, 1957; Türk Dil Kurumu [TDK], 1979). Throughout the years, geographers have employed several research methods in oral geography: research method books, personal histories, narrative texts and narrative analysis (Öztürk, 2013, p. 186), life history narratives, narration and historical memoirs (Patton, 2014, p. 115). Furthermore, a plethora of research and projects focus on the issues surrounding the use of each of the literary devices mentioned above (Abdülhadioğlu, 2016; Ankaralıgil, 2016; Çırak, 2016; Pabuçcu, 2013; Şimşek, 2016). There are several words we cite from other resources and researchers in our study, which led us to the concept of 'oral geography. In oral geography, these words refer to describing the earth (Tanoğlu, 1969, p. 1): knowing the world (Doğanay, 2012, p. 8), explaining the natural and human-induced phenomena (Doğanay, 2012, p. 13), in connection with the human activities with its own methods (Biricik, 2009, p. 3; Rey, 1998), reasoning to establish the relationships between human and space (Hughes, 1870; Özey, 2010, p. 1), reflecting interactions with the environment (Mackinder, 1887), explaining how humans are affected by relief, places and other societies (International Geographical Union, 2017; Royal Geographical Society, 2017), how societies change (Livingstone, 1992), referring to dynamic relations (Institute of Australian Geographers, 2017) and explaining causes and effects of the distributions of physical phenomena (Tanoğlu, 1964, p. 1).

In this definition, the necessity, usefulness and superiority of geographical knowledge are particularly emphasised. When we analyse relevant literature, we see that research on oral geography is limited. In the research conducted for this study, we emphasise that: The belief that the compilation of our local calendars based on thousands of years of individual and social experiences will contribute greatly to cultural geographical research (Güner & Şimşek, 1998, p. 129), The prediction that it can be benefitted from the peoples experience based on centuries of tried-and-true events (Erinç, 1984, p. 230), The appropriateness of using folk calendar data as well as measurement results during the study of climate characteristics (Koç & Keskin, 2001, p. 1), The importance of transferring the experience of the people to the next generation and systemising it (Özcan, 2015, p. 187) and The importance of transferring the geographical concepts formed by the local dialect in the nature of living cultural heritage to future generations (Yıldırım & Tarım, 2014, p. 18). Eliminating these insufficiencies is highly important and beneficial when

conducting studies of geographical education. In this context, we aim to determine the geographical discourse that takes place in personal histories of persons aged 75 years and older and how they use and interpret them in their daily lives and in society. While doing this, care has been taken to report the words and expressions exactly as participants use them, without changing them.

Participants were not asked questions about geographical events and concepts, but rather, were asked questions such as: How was it then? How about now? What/how did you do it? Did you work a lot? You said it was difficult. Could you tell me how you achieved it? We did this in order to start the narrative and maintain it, to keep the participant talking in relation to the subject and to give depth to their life story. Celestial bodies, navigation, telling time, climatic and meteorological features, dwellings and geographical information related to agricultural activities were used to analyse and compare personal histories using questions such as: What concepts do they focus on? Are these concepts consistent between different participants? Is it contradictory or does it coincides with geographical literature? Is there any confusion or misunderstanding of certain concepts in their explanations? Do the participants children or grandchildren use these discourses? How aware are they of these discourses? The aim of this study is to answer these questions.

## **Methods**

### **Model**

We conducted this study according to a qualitative research model, where the use of narratives is the preferred method (Robson, 2015, p. 186). The following literature was influential in selecting this method: revealing the cultural and social patterns by providing a perspective on individual experiences through narratives and life stories (Patton, 2014, p. 115) and being able to use this as an important research method in educational studies, the central role of researching and organising conceptual structures (Öztürk, 2013, p. 58–187). We use an unstructured interviewing technique to obtain in-depth data: allowing the interview to develop within their area of interest and curiosity (Robson, 2015, p. 347), creating the opportunity to get detailed information about the subject and the individual during the interview process (Tanrıöğen et al., 2009, p. 151) and not needing to determine the subject and the question before the interviews (Öztürk, 2013, p. 218). Interviews were conducted without any expectations, and we tried to discover information about geographical operations. While doing this, the participants needs were taken into consideration, and they were treated with patience and understanding. During the interviews, we did not establish a hierarchical relationship between the participant and the interviewer, and they were allowed to tell their personal histories freely. Participants were never

interrupted if the discussion went off topic. To keep the conversations from stalling, and to avoid interruption, we asked general questions about their daily life, from time to time, to add depth to the discussion (Altunışık, Coşkun, Batraktaroğlu, & Yıldırım, 2007; Balcı, 2004; Ekiz, 2009; Karasar, 2005; Kuş, 2003; Neuman, 2007; Tanrıöğen et al., 2009; Yıldırım & Şimşek, 2005).

### **The Study Group**

We selected the study group according to the purposeful sampling technique, enabling the researcher to select, using his, or her, own judgement, participants within a framework of easy accessibility. The study group consisted of five participants aged 75 years and older, including three males (M) and two females (F). The participants were born in 1932 (M), 1940 (F), 1939 (F), 1941 (M) and 1935 (M). All participants lived in a village built along the Karasu River, a branch of the Euphrates River. In 1972, this village was flooded and was submerged under the waters of the Lake Keban Dam. Following the flood, the participants, along with other village residents, rebuilt the village near the dam, which was only used during the summer. We limited the number of participants in the study group because obtaining data requires lengthy and in-depth interviews. Participants were reassured that their names would not be used in the study. Therefore, participants are referred to as S1–S5. In addition, after completing the interviews, we defined themes and categories in order to determine the degree to which the information, used by elderly persons, had been transferred to the next generation. Three participants (S6–S8), ranging from 32 to 39 years old (1977 (M), 1979 (F) and 1981 (M), i.e. the elderly participants who had children and grandchildren, child of S3 and the grandchildren of S1 and S5) were asked to read the narratives to observe if they were familiar with the words, expressions and phrases used by their elders.

### **Data Collection and Data Analysis**

We obtained the results of this study using face-to-face interviews (Yıldırım & Şimşek, 2005), a qualitative data collection technique. We performed unstructured interviews in order to avoid creating any constraints and to be able to discover events more consistently following the natural flow of life (Büyükoztürk, Kılıç Çakmak, Akgün, Karadeniz, & Demirel, 2008). We received expert opinions regarding the implementation of the methods before and after researchers conducted the interviews. Interviews were conducted according to advice received regarding the duration, numbers and time. Interviews took place between February and August of 2016. Voice recorders were used during the interviews with participant permission. Taking into account participant age, interviews took place in two, 15–60-minute sessions, to avoid fatigue and to allow time to reflect on any in-depth knowledge that they may have forgotten during the interview itself. After the completion of the

interviews, each recording was transcribed and reported. Each transcript was read back to the participants, by the researcher, in order to add or eliminate information or make corrections if needed. Once approved by the participant, the final version of the transcript was complete. We performed content analysis on the data collected in order to explain the concepts as well as the relationship between these concepts. We studied each conversation in detail, and the similarities and differences between participants were noted. Based on the analysis of each participant, we created categories and themes, which created unification between the narratives of each participant. Our results, which have gone through the process of encoding, theme configuration, editing, identification and interpretation, have been classified and interpreted based on physical and human geographical features. In order to increase reliability during analysis, care was taken to report direct quotations, write explanations for local jargon and use them in the correct context. In order to evaluate the narratives, three participants, who have children and grandchildren, were asked whether they were aware of these histories and expressions by reading it to them. In accordance with ethical research practices, the names of participants and the names of their settlements have been coded, and the data have been archived (Yıldırım & Şimşek, 2005). We discuss our results by comparing them with the literature.

## **Results**

People have a geographical accumulation of knowledge, which they use constantly and which originates from daily life experiences. People transform this knowledge, which they have passed down from generation to generation, into occasionally humble words, and such knowledge is then skilfully transformed for use in their daily lives. Acknowledgement of these experiences is extremely important and must be used, if necessary, and should not be forgotten. Here, we attempted to identify the geographical experiences, of elderly persons, by conducting unstructured interviews, not only asking questions about geographical events and concepts but also allowing them to tell their personal histories. The findings are presented according to the physical and human geographical characteristics that we defined.

### **Physical Geographical Characteristic Results**

Concepts such as stars, navigation, telling time, temperature, rainfall and wind and other related subjects were discussed at length during participant interviews conducted by the researcher.

**Celestial bodies.** Participants benefit significantly from celestial bodies in their daily lives. They particularly relied on celestial bodies in terms of telling time and navigation. This results from both the lack of clocks and the fact that their use was not common. For example, if participants planned an early morning trip, they used the Morning Star (i.e. the planet Venus) and the North Star (Polaris) to navigate, in the morning and at night, respectively. Additionally, they described various benefits from tail stars for harvesting and using them to mark seasonal changes.

Using the SkyView Free program, we find that several of the celestial bodies identified as stars, by the participants, are not actually stars but are planets in our solar system. The positions of these planets vary during certain events and periods throughout a calendar year. The participants' statements with regard to this subject are as follows:

Every participant used the term *Carriage Devastating Star*. Stories told by each participant have similarities. However, it is common knowledge that elderly people, in this region, no longer use the Morning Star for navigation, but it is still widely mentioned in their stories. Even when the Morning Star is mentioned, participants fail to point out the difference between it and the *Carriage Devastating Star*.

In reality, stars do not move as participants have expressed in their stories. However, none of the participants in the region used the concept of a planet, referring to all celestial bodies, apart from the moon, as stars. Although different names were used, participants used the North Star correctly and in the right context. We note that participants use the Sun, which is a star, and the Moon, which is Earth's satellite, correctly because they use their respective proper nouns.

Participant S1 expressed the Morning and Carriage star concept as follows: There were not many cars in our youth. We always walked to the city (city of Çemişgezek). I can recall walking to Elazığ by foot as a child. On most trips, animals were used. Mostly donkeys. There were not many horses. We would set out in the dark before dawn<sup>2</sup>. On our way, our elders would occasionally tell us about the stars and their features. "Carriage Devastating", for example, is a star that looks like the Morning Star. It doesn't rise in the morning but rises before the break of dawn. So, it rises at night. According to stories told, the travellers would mistake this star for the Morning Star, which signified that it was morning, and actually set off during the night, and they would be caught unprepared for snow and storms. As a result, even after waiting for long periods, morning would not arrive. Their animals were wasted and the people would freeze to death. The name (Kervan kiran) was given to this star for this reason.

Both participants S1 and S3 frequently used the concept *Stake of the Sky* instead

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<sup>2</sup> Light that appears just before sunrise (TDK, 2017a). Light seen on the horizon before sunrise (Kubbealtı Lügati, 2017a).

of the *Pole Star*. When indicating, on a map, the location of this star, participant S1 stated: This star does not look very bright. There are also no other bright stars around it. Participant S3 added: This star always shows the north. Participant S2 also used the term *Şimal* (North) Star. When asked how he determined its location, participant S1 stated: There are not many bright stars on either side. There is a broken chair right next to it... Uncle Y. taught me how to find Qibla (south) by turning my back to the stake of the sky.

For participant S3: In the days when the summer months turned into autumn, as commonly said by the people of the region when leaving its place to the fall, the tail star is born. The tail star rises from where the sun rises. This is why we say *doğdu kuyruk, kalmadı koruk* (Tail has risen, grapes are gone). Participant S1 used similar expressions that supported the narrative of participant S3: This star is born early in the morning after the harvesting of grapes. The tail star is born on the path of the Sun. When the tail star is born, the weather calms down and changes.<sup>3</sup> References to the birth of a tail star strongly suggest that it is most likely a planet.

Statements made about the moon show similarities with common Turkish expressions. The expression When you see the crescent its Ramadan, see it again its Eidi (S1–S4) confirms this generalisation.

**Navigation.** Through our interviews, we observe that local people have developed several practical exercises in terms of navigation and chartering time. We observe that the direction locals use the most is south. Religious practices have significantly influenced the frequent use of the southerly direction in the daily lives of the study participants. They use the North Star for navigation during the night and the sun, and the shadows it creates, during the day. However, we observe that locals use the summits of the highest mountains, on the horizon, as a triangulation point, orienting themselves accordingly. Maden Mountain is the summit most frequently mentioned among the participants.

Participant S1 recalls: the star that shows the north is the stake of the sky (North star), You will turn your face to the north, so to the mountain of Maden, the sail is less in the Maden Mountain in the south. Participant S2 states ‘South’ by showing it with his finger and “That little hill on Mt. Maden”, which are some of the examples given.

<sup>3</sup> According to Güner and Şimşek (1998), Tail is the name of a star, and a deterioration in the climatic conditions was observed along with the presence of the star. In the middle of the summer in Iğdır (August 5) a significant change in the temperature occurred. This day is called the birth of the tail in the region (Güner & Şimşek, 1998, p.134).

**Telling time.** On 26 December 1925, Turkey reformed its calendar. The public, however, continued to use the calendars that were in place before the reform<sup>4</sup>, because certain religious days, nights, months and other times were constantly needed and based on previous calendars. Therefore, in the study region, even though cultural traditions and practice, referring to calendars, were not written, they were still passed down from generation to generation. For example, participant S1, born in 1932, remembers expressions and traditions related to the Rumi and Hijri calendar (e.g. prayer and mealtime)<sup>5</sup>: The old day style, I mean the old father style was used. The government style is the style that we use now. There wasn't many time telling devices in the past. Even if there was, we would set our pocket watches to 12 o'clock after the evening prayer<sup>6</sup>. So we would not need the radio-television as it is now to set our clocks. Participant S5 used the expression the old style, I mean our style.

4 "Any event that is considered important by the community or affects social life is reflected in the calendar of that community... The public calendar is the product of lengthy experience and knowledge." (Güner & Şimşek, 1998, pp. 129–131). According to Gönen (2006), the people's calendar is the natural phenomena gained as cultural heritage by the local people, established by relationships between social institutions and phenomena based on long-term experiences and historical, traditional, educational, religious, legal, agricultural, political, economic ties, a series of the time-life duality that undertakes the task of remembering and reminding. A series of time-life dualities based on long-term experiences that local people are given as cultural heritage (Erginer, 1984, Yıldırım & Tarım, 2014). Time spans among the people based on their experiences; in those days when there was no use of the clock, the sun played a part in determining the months which makes up the years, the days that make up the months and the specific times that make up the days. In addition, the year is separated into seasons, especially two main seasons. These are summer and winter seasons. In addition to this, the seasons are also divided into various time periods like zemheri (cold winter), güçük (February), cemre (start of spring) and so on. This calendar, which is based on the people's long observations and experiences, is called the public calendar (as cited in Gönen, 2006; Yıldırım & Tarım, 2014, p. 23).

5 Rûmî: Anatolian, living in Anatolia, involved with Anatolia. Rûmî year: The year according to the Rûmî calendar. The Rumi calendar: The solar calendar used in financial transactions after 1678 in the Ottoman Empire that is 13 days behind the Gregorian calendar (Kubbealtı Lügatı, 2017b). The Hijri calendar, based on the lunar year; Hijri-Shamsi (The beginning in September 20, 622. It is based on the Earth's movement around the Sun) and Hijri-Kameri (Arabic, beginning in Muharrem 1: July 16, 622. It is based on the circulation of the moon around the Earth). It is divided into two calendars (Unat, 2004, p. 4). Due to the difference between Moon days and Sun days, there is a decline of about 11 days per year in Hijri calendars, in comparison with the Gregorian Calendar (Unat, 2004). The Rumi (Mali) calendar (Jallein Calendar), based on the solar year, accepted as the start of Hijri calendar, began to be implemented on March 13, 1840 (Unat, 1988, p. 163). After this date, for about 30 years, the Hijri and Rumi calendar were used together. On March 1, 1917, the Julian-based Rumi calendar was abandoned and the Gregorian calendar replaced it. On December 26, 1925, the Turkish government reformed the calendar. From 1 January 1926, the millennium calendar, based on the Gregorian Calendar, was applied instead of the Hijri calendar (Unat, 1988, p. 163). Based on the use of 24 hours in a day, the current time form is regarded as the only official time scale (December 1, 1925; Unat, 1988, p. 163). On June 1, 1935, the day of rest, for the week, became Sunday (Unat, 1988, p. 163). On 10 January 1945, the transformation of the months into Turkish; Teşrin-i Evvel into Ekim, Teşrin-i Sani into Kasım, Kanun-i Evvel into Aralık, and Kanun-i Sani into Ocak was accepted.

Table 1  
The Names of the Months according to the Millennium, the Rumi and the Hijri Calendar, which the Participants used in Our Research (Unat, 2004; Yıldırım & Tarım, 2014)

Gregorian (Sun) calendar	January	February	March	April	May	June	July	August	September	October	November	December
Rumi (Sun) calendar	Kânûn-ı Sâni	February	March (New Year)	April	May	June	July	August	September	Teşrin-i Evvel	Teşrin-i Sâni	Kânûn-ı Evvel
Hijri (Month) calendar	1 Muharrem	Safer	Rebi-yüevvel	Rebi-ülahir	Cemazi-yevvel	Cemazi-yelahir	Recep	Şaban	Ramazan	Şevval	Zilkade	Zilhicce
	November (Winter): November 8 to May 5					Hızır (Summer): 6 May - 7 November			November (Winter)			

6 For example, according to the time used on 1 January 2017 (i.e. time in its current form), the evening prayer is at 17:54. According to the prayer clock, the evening is at exactly 12:00 o'clock. Whereas on 1 February 2017, the night prayer will be at 18:28. At this time, the prayer clock is reset to 12:00 (Türkiye Takvimi, 2017).

The participants also have a number of practices to identify prayer times without using a clock. We observe that the participants predominantly use the sun to identify these times. Participants especially rely on the colours that the sun creates in the atmosphere as well as shadows that form on objects. For example, for prayer times in the morning, evening and late evening, locals made assumptions according to the colours of light in the air. At noon, taking into account the direction, locals benefitted from the position of the sun. The length of shadows determined the late afternoon prayer time.

Participant S5 stated: When the morning the air turned white and clean, it was Morning Prayer time. When the sky has darkened a bit, so if it's a bit dark, it would be time for the night prayer. Participant S1 recalled: If the *ayam* (weather) was clear, we would determine the prayer times by looking at the sun. For example, at noon, if you turn your face to the north, that is, towards the Mt. Maden and the sun falls on your right eye, it is noon. If the shadow is twice the size then it is the late afternoon prayer time. In order to determine the time of the evening prayer, at dusk we would look in the direction of the sunrise. If the reds are as high as a mass<sup>7</sup>, the evening prayer can be read. It means that it is time'. For participant S2: When we were out at the field, we would plant a tree or a piece of grass or a stem, whatever we could find. We would mark the length of the shadow. We measured the shadow of the piece, if it was more than double the size it meant that it was late afternoon prayer time. If we were at the house, we would look at its shadows. If the shade of the house reached the edge of that wall, it would be noon. If it reached that trees trunk, it would be late afternoon. There would be no need to make any calculations.

Participants declared that, more recently, they developed time-based practices, with the more frequent use of clocks in their daily lives. As a matter of fact, participant S5 said: In recent times, where time is more prevalent, we have come to respect it more. For example, the late afternoon prayer is 2 hours before the evening prayer, and 1–1.5 hours after the evening prayer, 1 hour even, it is time for the night prayer. It's easy now. Look at the calendar, that's it.

Months were used to determine the days of Ramadan and Eid. Expressions such as Fast when you see the crescent, stop when you see it (S3) are frequently encountered. The moon will be on the west side, but it will be less (S5). However, participant S2 stated: I still remember my father saying this crescent is two days old I think we started late. This shows that they occasionally experienced hesitations in the determination of dates.

<sup>7</sup> A long stick with small nails on its tip, which helps to push the cows, *misâs* (Sağır, 1995), *Övendire*, *modulmassa/masta* (Gemalmaz, 1995; TDK, 2017b).

**Climatic and meteorological features.** The relative humidity is low in the region where interviews were conducted. This situation, dry air warms up quickly and cools down quickly’, accelerates the transition between seasons depending on the origin of the air. Therefore, the transition between the summer and winter season is faster, and the effects of the months of spring are less pronounced. To evaluate these changes, and to explain situations reflecting the characteristics of the regional continental climate, locals use expressions such as the last month of autumn is considered winter’. Interestingly, in relation to this, participants S1 and S2 used the expressions ‘Here the winter passes hard. That is why we have to make our preparations for winter early. In our opinion, the last month of autumn is considered to be winter’ (S1) and ‘We do not really leave any work till November. Actually, we never do (S2).

Critical thresholds for February, March and April appear in the expressions used by locals. For example, in almost every region of Anatolia, used in relation to the 9th of March, the saying “March give you a peek through the door, but makes you burn diggers and shovels” is used also by us. In addition, do not fear<sup>8</sup> from the winter, fear April the 5th. It separates the oxen from its mate is also used (S1).

Furthermore, expressions emphasising March 9 are much more prominent. The individual experiences of a participant have a significant influence and play a decisive role in determining the magnitude of that emphasis. The experience of participant S1 is one example that shows this in particular: Some years do not do March 9. But some years do. On March 9, in Karkutlu (locality name) I came and untied the cows. The weather was cold and rainy. Northeasterly winds blew, snow. I came out’. In February or March, in Taşın Başında (locality name), one of a man’s two bulls froze while working in the field. It was taken by the crazy northeasterly wind, would it leave already? The man couldn’t unleash the bull. He’s released one. The one he released came to Kerora (locality name). The other died from the cold. For March, participant S2 used the expressions ‘March 9 steals the knob and March, throw the stick, and lay there.

Which we think might be done with the knowledge that the temperature changes according to the view... We always make our houses facing Qible (to the south) (S2). Today, this practice is done to properly benefit from solar energy for regions that have long, hard and cold winters.

Used in Turkey in general, and in the region where the interviews were conducted, the expression Cemre<sup>9</sup> and similar expressions are used: Cemre ahir<sup>10</sup>, winter ahir (S1 and S2). ‘The first cemre falls into the air, the second cemre in the water and the third cemre falls onto the earth (S1–S5).

<sup>8</sup> Very cold days between December 22-January 31, karakış (Kubbealtı Lügati, 2017c).

<sup>9</sup> It expresses the hot weather conditions after a prominent cold period (Erol, 1999). It is written in the sources that Cemre has fallen into the air, water and soil in order (Kubbealtı Lügati, 2017d). The accepted dates for these are the 7th, 14th and 21st of the Rumi month Güçük, and the 20th and 27th of February and 6th of March.

<sup>10</sup> Ahir: Âhir, last (Turkey’s Turkish Dialect Dictionary, Korkmaz, 1994).

Participants also make estimates of seasonal temperatures by looking at the blossoms of the trees in the spring. Participant S2 used, for example, the expression if the blossoms are stubborn<sup>11</sup> winter will be long.

When climate characteristics are taken into consideration, we observe that irrigation is necessary in agricultural areas of the region. However, this was not achievable for certain circumstances of those days. In addition, identical agricultural techniques are still used in the grain fields. These techniques and knowledge, passed down from generation to generation, are valuable to the people of the region, especially in terms of benefiting from precipitation. Participant S1 stated: We harvest wheat and barley in this region. Mostly wheat. Their growth depends entirely on the rainfall. Especially spring rains. Because we cannot water them. We used to have watery fields before but they were flooded (Keban Dam). Rain is a blessing for us. Actually, it doesn't rain much. We wait for the rain after the crops are planted. Because our products are fertile in the rain. Every wind that blows here does not bring rain. If the cloud comes from the shore (from the south, southwesterly), it will rain. There are also several expressions used to take advantage of winter snowfall, particularly when winters are harsh and long. For example, participant S4 recalls the expression: Snow is more important for autumn wheat. Snow protects it from the frost. It fulfils its need for water by melting in the spring.

Participants declared that in certain work, rain-free and windless conditions were important. They said that they could predict whether it would rain or not from the clouds over the mountains in the south, as well as the weather conditions in the south sector. However, they stated that wind predictions were more difficult. Participants mentioned that they specifically chose the early morning hours to predict the wind, looking at clusters of clouds, which resembled sails, surrounding the mountains. Furthermore, they stated that, before making predictions, village elders were consulted. They pointed out that 'some old people are very talented (S2) in this regard. Furthermore, participant S2 stated: It is important to predict if the wind will blow or not during the day in terms of planning our work for the day. For example, we do not want windy weather if we are going to make molasses or dried fruit pulp. However, if we are going to air out any products, then we want windy weather. The length of the work we do is important in terms of organising our work. If it is a short-term job and we do not need the wind, we choose the early hours of the morning because it is not windy at these times. The air will be calm. Participant S1 stated: We can tell from the sails over the mountains if the wind will blow during that day. If there are sails on the mountains before noon, it will be windy that day. There are more sails on Mount Hosta in the north. There is less on the Maden Mountain in the south.

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<sup>11</sup> The part close to the trees body.

## Features of Human Geography

The experiences of the participants, regarding settlement location, the look of the houses, the building materials of the houses, the illumination, the tools used, the abandonment of fields, the cultivation of crops, the pruning of trees and river usage, are quite extensive.

**Domicile characteristics.** Participants equally agree that the choice of the place of residence, its construction and statements that take into account the cold winds, especially important in the winter, are crucial. These themes reoccur throughout the testimony of each participant in the study.

An expression, from participant S2, relating to the fact that houses should not be built on the skirts of the valley, building a home on a creek is for a flood.., recurs in the testimonies of all participants. This warning is intended to protect villagers from the threat of flooding.

Statements from participant S2, ...Houses are always built towards Qible, and S1, the hills south face blocking the north-easterly winds are used, are statements that not only foresee the advantages of solar energy but also give us an insight into how high of a priority it is to find a safe location when establishing a place of residence.

In this region, the building material of choice is rock, due to the presence and variation of many rock types throughout the study area. The use of mud brick (*kerpiç*) is limited, but it is mainly used in the outbuildings of the house. Speaking about building material, participant S1 states: A rock house is preferred to a mudbrick house. Mudbrick home may be warmer but it is hard to maintain. Because it will not be sturdy and long-lasting. But the inner partitions of the house are made with “lamb mudbrick”.<sup>12</sup> If you do not add beams to the mudbrick walls it is difficult to keep them standing. My father told me that a mudbrick wall that he very quickly built tilted at the end of the day, and he had to pick at it with an axe and straighten it by shaving it.

Woodworking and carpentry work materials for the construction of doors and windows are some of the most expensive items when building a house. ‘Timber is the most expensive material in house building. Also the doors and windows, stated participant S2.

In the continental climate of the study area, where winters are harsh and long, the most common form of heating is stove. Participants also mention that stoves made from sheet metal, locally called tin (S2) stoves, are one of the most common heating devices. Remarkably, in the winter, participants heated a section of their barns to stay warm. Participant S2 states, with regard to this subject: In the winter we used to sat in the barn. The barn area was two steps higher than where we tied the animals, where they could not reach us. We burned the stove to warm up. We would cook on the stove

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<sup>12</sup> *Kerpiç*: primitive brick mixed with straw and mud, which is dried in a mold to be used in wall making (TDK, 2017c). *Kuzu (lamb) kerpiç*: half of the main *kerpiç* brick mold.

and warm ourselves up at the same time. The pantry was on the upper floor. We used to go up and down the pantry (hapenk) using the stairs on the side of the barn.<sup>13</sup> The main reason we preferred the barn in winter was because it was warmer. It was also stated that pine kindling was used for lighting the barn. In the evening, we burned pine kindling (Çıra).<sup>14</sup> I would do needlework under this light. Gas lamps soon came out.

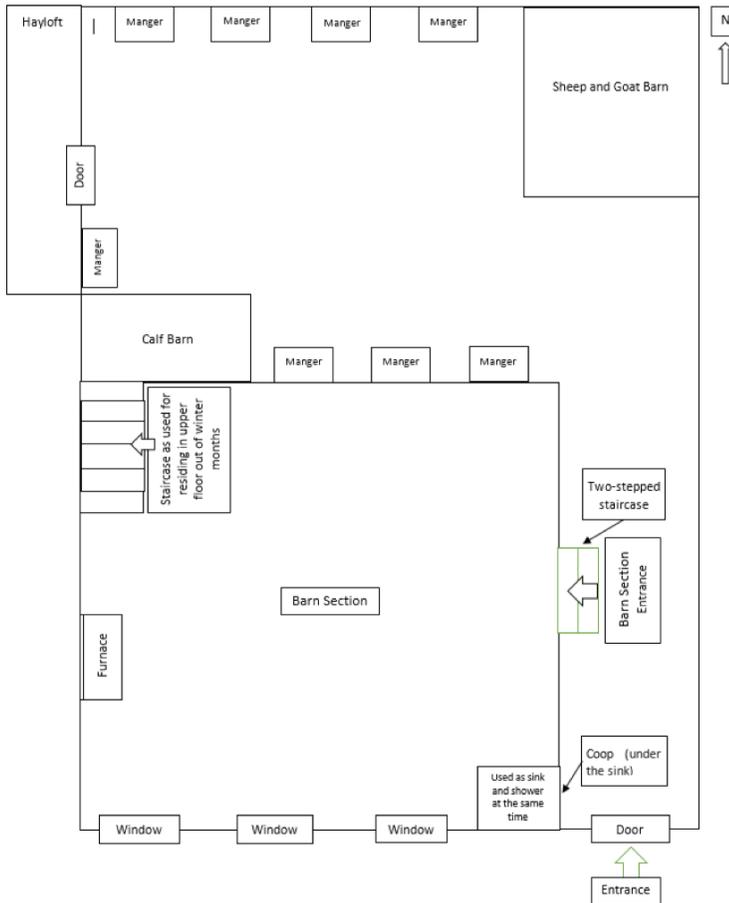


Image 1. Barn Section Plan 1.

*Note.* Participant S2 stated that they used this barn section in the winter months until she became a bride in 1955. She also mentioned that one of her parents used it until it was flooded during the Keban Dam flood in 1972. There is no definitive information concerning the construction date of this house. However, she said that she knew it had been built before the birth of her father (1901). She even stated this: ‘The elders would always mention how, on his way to World War II, my grandfather, who later became a martyr, climbed on top of a wall by the house<sup>15</sup> and shouted “Neighbours, come, the state is having a wedding.”’

<sup>13</sup> Horizontal door entry between two floors. *Dam Kapsısı* (Buran, 1997; TDK, 2017d).

<sup>14</sup> A kind of lighting tool that lights by burning parafin (TDK, 2017e).

<sup>15</sup> Demolished building and its land (TDK, 2017f).

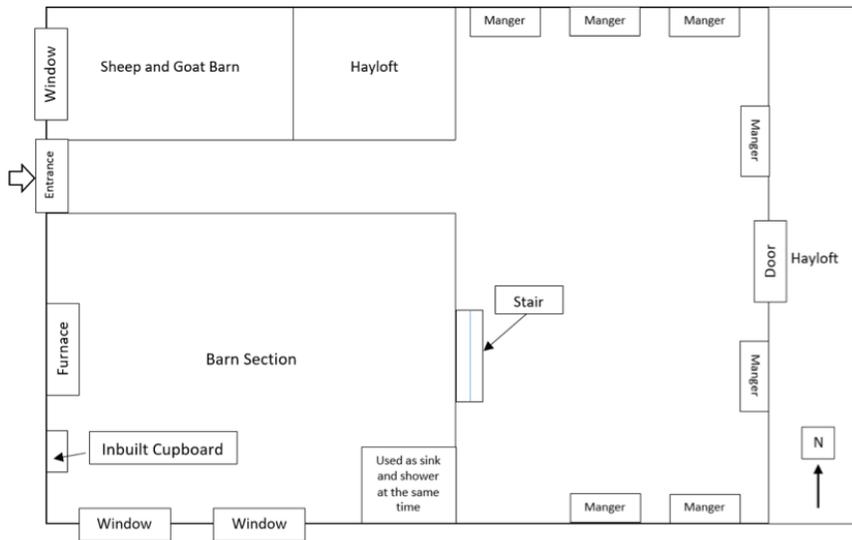


Image 2. Barn Section Plan 2.

*Note.* This is the plan of a barn section that participant S1 stated they used until 1957. He stated that she did not know the date of construction, but they renovated the barn around 1955–1956.

**Agricultural activities.** In the study area, summers are hot and dry. Therefore, a large amount of water is necessary for agricultural activities. Using natural routes through the region, locals have tried to eliminate this necessity. Using spring rains and winter snowfall to their advantage has become a common practice throughout Anatolia. Farmers tried to plant their grains in the autumn (fall), believing snow coverage to be an effective method to protect produce from the cold in the winter, and an effective technique to water the produce in the spring when the snow began to melt.

With respect to this, participant S1 stated: Wheat is planted during fall (autumn). It would be nice if it was a paşavra. I mean, it would be nice if it was at hands length. The wheat that was about hands length would turn yellow in the cold of winter, but there was no harm. Then it would restore itself. Participants recognised that February is the appropriate time for planting barley. In this regard, these statements were made: According to the old way, barley is planted in February. If barley is planted in February, the barley will be very nice. Furthermore, participant S2 stated: February's barley, March's foal.

Rotating the fields used for agricultural practices, in order to allow soil to replenish essential nutrients, is a common practice in the study region. For example, chickpeas are planted in order to make use of produce, as well as to extract salt from the soil.

Participants S1–S5 use the term *hozan*<sup>16</sup> for fields that are left to rest in the region. We observe that the period when the pear tree was in bloom coincides with the correct period to plant chickpeas. Participant S2 noted: Chickpeas are planted when the pear flowers. Fruit and vegetable gardens are in May and wheat in October. Furthermore, participant S3 stated: we planted melon and water melons in May. Participants also mentioned that rosehip blooms indicated the new mushroom harvest and that blooming monk bellflowers indicated the maturation of grapes: If the monk bellflowers open white-white/purple-purple on the fields, the grape reaches maturity, when the rosehip blooms the oak mushroom comes out, participant S2 stated.

Between February and March, wood-gathering- and tree-cutting-related activities began. Expressions used by participant S2 give evidence for this: In February men go out in the morning to the fields, after lunch,<sup>17</sup> they go to cut the bushes.<sup>18</sup> Women go to chop wood in the early morning. After lunch, they go to sweep the vineyards. If there was any wood we would collect them and come back.

Participant S2 also discussed pruning trees in March: After the 9th of March, the vineyards are pruned.

Another important agricultural activity, in terms of eliminating pests, discussed by several participants is hoeing. This activity also improves the irrigation process. With respect to this issue, participant S2 stated: ... The hoe dries out weeds. Keep your field clean, to hoes is one water.

The participants' village that we surveyed was built near a crossing along the Karasu River, a tributary of the Euphrates River. However, all participants use the name *Murat* for this river, instead of the Karasu. The crossing, which is situated at the edge of the village, is infrequently used by the surrounding villages and therefore has no significant commercial value. Travellers wanting to use the crossing were often given passage free of charge. Regarding this, participant S2 stated: 10-15 bundles of saddle grass were connected to each other. Sticks were placed on it and a *hapat* (raft) was made. You could sit on it, with the use of wooden paddles you could cross to the other side. No money was taken. There were also those who used empty tins in the construction of the raft.

Participant S1 stated: Among the Murat (Karasu) there are small settlements, especially above the crossings, that were placed in this area later on like us. Muğadim (Mukaddim), Bileç, Orzuk and Şingah are some of these. They most probably placed

<sup>16</sup> An unplanted field, a resting field, a field that hasn't been used for a few years (TDK, 2017g).

<sup>17</sup> "When men went to work in the fields we used to make fresh bread or heat up some bread for them. We would put onions, and cheese if we had any. We'd get the donkey ready. Then we'd put the cows at the front and send them off" (S2). When asked why they might not have cheese if they owned cattle they answered: If the cows had young, there would not be any milk available for two months. If it is infertile then the milk is already drawn. There is very little (S2).

<sup>18</sup> A thorny plant used to surround and protect vineyards and gardens like a fence. A small, scanty, forked, woody part of a tree with very dense branches (Kubbealti Lügati, 2017e).

them here in order to control the crossings. For example, in the time of scare, the bandits surrounded our house, my grandfather who was a child then escaped from the chimney and saved his own life. The larger one came to this village. This K. scare period lasted for many years. I hazily remember from my childhood, that the villagers would gather in the village room and that they would take turns guarding the village at night. The elders told us that the bandits used the crossings, stealing animals especially from the nearby and opposite villages (Ağın side villages - S5). As a matter of fact, in an incident related to this, they killed one of the villagers.

Fishing, as expressed by participant S2, was rarely practised along the Karasu, with the exception of a few people. Villagers went fishing, on the edge of the river with baskets and similar materials, only during the spring months, when the river was cloudy. 'From March to April, when it was rainy, the water would rise, and we would go to Murat to collect wood. We would go in up to our knee caps and throw the wood that came to the side. During this period, Murat would flow cloudy, like mud. When this happened, mud would get into ears of the fish and the fish would become dazed. We could then catch the fish from the edge. Otherwise, nobody would bother fishing, stated participant S2.

**The transfer of geographical discourse from generation to generation.** After completing the interviews with the participants, and the themes and categories were established, the discourses were read to three persons who have a blood connection with the interview participants in order to determine whether the elderly transmit their geographical discourses to younger generations. Participants S6–S8 were asked whether or not they had heard these discourses or knew or didn't know about them. The participants answered these question as follows: Yes, I heard all of these words, I heard them from my mother, it's true, I did not hear it, no, I do not know, and but we do not use it very often (S6); OK, my father would say this a lot and yes I've heard it (S7); I remember but I do not use it and We mostly use the Internet (S8). According to their responses, we find that the transmission of discourses is quite high. However, it is interesting that the following expressions, in parentheses, were not known or used by participants S6–S8: S7 (When the tail star was born, the air is calm), S6 (When there are sails on the mountains before noon sailing, it will be windy that day), S8 (When the Köremez opens, the belly comes out) and S6 and S8 (if the flowers bloom stubbornly, the winter will be). This is actually not an ideal situation, because it interferes with the transfer of discourse between generations. The fact that these terms as a form of living cultural heritage cannot be passed down to future generations means that the values of their local culture are gradually disappearing (Yıldırım & Tarım, 2014, p. 18). Briefly, although we are unable to determine to what extent, the geographical discourses of their personal histories are transferred to younger generations. However, these results have been determined with a limited number of participants, and thus additional research is required to corroborate these results.

### Conclusion, Discussion and Recommendations

The purpose of this study was to assess the geographical discourse of personal histories belonging to people aged 75 years and older and evaluate them in the context of astronomy, location, navigation, telling time, climatic elements, settlement location, dwelling maintenance, housing construction materials, preferred rooms according to the seasons, cultivation, tree trimming, resting the soil in fields and the use of streams. These geographical arguments, within the discourses, that the participants practised throughout their lives and the geographical information in the literature support each other. Indeed, in sources, the following approach is apparent: seeing oral narratives among a historical source of geography (Maddrell, 2009), accepting the “narrative investigations” as an innovative tool (Summerby-Murray, 2010), finding the methodological use of narratives important (Hay, 2004), emphasising the desire to benefit from experience (Wiles et al., 2005), seeing the construction methods of the narratives as a useful example (Crang, 2003) and the narratives are considered as a great potential for geographers (Wiles, Rosenberg, & Kears, 2005). The discourse of the people of this region and expressions emphasised in the definition of geography such as “human-locality relation” (Özey, 2010, p. 1), mutual interaction (Mackinder, 1887), “natural, human and economic phenomena” (Doğanay, 2012, p. 13), their relationship with each other (Hughes, 1870) and distribution and causes (Tanoğlu, 1964, p. 1) are satisfied. Based on these findings, we conclude the following.

Participants rely on celestial bodies to determine time and location. The infrequent use of clocks was effective in establishing local dependence on celestial bodies in order to tell time and location. In interviews, words to express time, such as before the day dawns (S2) and before dawn throws (S1), are frequently used when going out to the field. Expressions such as tail star rises, no grapes left (S3) demonstrate how people of this region used celestial phenomena, such as the tail star, to indicate periods of harvesting as well as seasonal changes. Participants used both the Morning Star and the Carriage Devastating Star to determine the time, and they benefitted from the North Star when navigating. Henderson and Gregory (2000) state the importance of using expressions to represent nature: In geography, novels, stories, poems and trips are being studied in terms of how places, landscapes, nature, regions and nations are represented. In addition, geographical processes such as urbanisation, migration and colonisation are examined for the same reason. Expressions used by the participants support the following observations made in Wiles et al. (2005). Narrative approaches create great potential for geographers interested in everyday life dynamics. These expressions and concepts related to time and location are in need of new research.

Participants used and referred to the concepts of the sun, moon and North Star that are in agreement with previous geographical literature. The occasional use of the expression Stake of the Sky instead of North Star may refer to a star that

does not change position. However, the fact that participants occasionally mistake celestial bodies such as planets for stars (e.g. the tail star, Morning Star and Carriage Devastating Star) shows that participants have a number of misconceptions in this matter, because these celestial bodies are not actually stars, but sometimes they are planets (Marioni, 1989; Novak, 1990, 1997; Riche, 2000; Stephans, 1994).

In the interviews conducted with the participants, we observe that local people used the highest visible mountain in the vicinity to determine direction, whereas celestial bodies were used more for telling time. In their testimonies, participants stated that they used the sun and Mt. Maden during the daytime and the North Star at night-time. Participants benefitted from both the sun and moon to tell time. In particular, we see that participants used shadows, created by the sun, benefitting from colours created in the atmosphere during the sunrise and sunset. For example, expressions such as 'if the shadow is double in size, it's late afternoon' (S1–S5), 'if a crimson rises a hand's length, it's the evening' (S1 and S5), 'if the sun falls on your right eye when you turn towards Mt. Maden, it's noon' (S1) or '...this crescent is two days old' (S2) can be found in the statements of almost all participants. With the widespread use of watches, they developed practical applications: at night prayer it's 12 o'clock (S1) and 2 hours to evening prayer is late afternoon prayer, 1–1.5 hours after evening is night prayer (S5).

When speaking about the dates of March 9<sup>th</sup> and April 5<sup>th</sup>, expressions such as 'old way, our way, the old day way - the government way and According to the old account, barley is planted in February' (S2) were encountered and used frequently. There are also several practices that have been developed about planting times such as chickpea at pear blossom, fruit and vegetables in May, wheat in October (S2). The expression 'the last month of autumn counts as winter' (S1) indicates the effects of humidity on the transition between seasons. 'Do not be afraid of the cold winter, be scared of April 5<sup>th</sup>' (S1) indicates the presence of critical thresholds for certain months. 'We build our houses towards the Qible (south)' (S2) is indicative of temperature changes according to different dwelling positions. 'Last Cemre, end of winter' (S1, S2) is a statement that indicates an increase in temperature. These expressions, which are shaped by years of experience and the accumulation of knowledge, are, according to Yildirim and Tarım (2014, p. 28), the result of economic activity, applications clustered around the mass production of items in society, the systems of beliefs and beliefs related to them.

The participants' discourse also indicates signs of using snow and rainfall to their advantage in agricultural applications and predicting rainfall and wind. For example, this is illustrated by expressions such as 'southwesterly winds, bring rain' (S2), 'if there are sails around the mountains in the morning, it will be a windy day' (S1), 'the earth does not move in the early hours of the morning' (S2) and 'snow is more important for autumn wheat because it protects it from the frost' (S1).

With respect to the locations of where dwellings will be built, the expression the hillside that blocks the north-easterly winds is used (S1) is a result of an accumulation of knowledge regarding the origin and direction of cold, winter winds, in this region. A warning such as, don't build a house on a creek (S2) reflects the importance of protecting homes from frequent flooding. Additionally, statements discussing the use of rock and its advantages in home construction, and the use of specific rooms of their homes in colder months, referred to as *Ahur sekisi* (*section of barn*), were common in all participant interviews.

Participants declared that they did not benefit from the stream near the village, and from the stream crossing: apart from catching wood and fish once or twice a year when the river water increased. Contrarily, due to their location, the bandits threatened their lives and property, placing villagers in harm's way. The location of the settlement in question and the human interactions caused by its location are also interesting topics to investigate. The details of these interactions are important in terms of clarifying the distribution, interest and cause-effect principles of the people involved. Oral narratives and autobiographical memories can help us understand the relationships between important historical resources. Maddrell (2009) stated: Historical sources of geography are generally divided into two. Primary sources are archives containing personal or professional articles, letters, manuscripts, corporate records, unpublished original texts and oral narratives. The secondary sources are existing narratives, related literature, review articles, investigations and biographies in relation to the subject. Whereas McPartland (1998, p. 341) stated: Autobiographical memories, the nature of geography teaching in the past offers some insight in relation to the quality.

The geographical knowledge established in the narrative of the participants aged 75 years and older seems to support predictions made by Yildirim and Tarım (2014, p. 19) many details of the human-environment interaction in the place where they live are recorded in the memories of old people. The happenings witnessed by the people, their experiences, their perceptions and the use of these in the education of later generations is essential.

Throughout the course of the interviews, we observe that participants use the expressions *Murat* instead of *Karasu* and *sea* instead of *dam*. The construction of the *Keban Dam* Lake, part of the Karasu River basin, has reduced the use of the expression *Murat* to some extent. We consider the fact that locals still use the expression *sea* for the Keban Dam Reservoir, which fills the basin, to be an ongoing misconception. This is most likely due to expansive, sea-like, area that it covers.

Narrative approaches create a great potential for geographers interested in everyday life dynamics (Wiles et al., 2005, p. 90). Narratives, oral history and other ethnographic research techniques used methodologically, have an important place in

the social sciences (Hay, 2004). The personal histories of all of the participants are in agreement with the approach of Summerby-Murray (2010, p. 232): narrative inquiry, has emerged as an innovative tool for students to internalise the basic concepts, think about experiences or to encourage creating theoretical ideas. With respect to using personal histories in geographical education, it is entirely possible that we can take into account McPartland's (2001, p. 125) opinion: Geography teachers tell a story; students can learn a lesson. This situation has already been emphasised by Crang (2003, p. 498), which may be a useful example of a constructivist approach: In creative writing techniques, especially those who use first person narratives, offer a similar experiential affinity. These techniques are among the useful examples of constructivist methods that come to the forefront in human geography and are generally found in social sciences. Additionally, Wiles et al. (2005, pp. 89–90) state that: Geographers often want to take advantage of the experience of the participant when interviewing. These experiences could be a series of events or phenomena. A detailed examination of what it means to the individual when explaining an activity or experience takes place. Thus, personal histories are critical to accomplishing these objectives.

Based on the results obtained in the research, the following suggestions can be made. Yildirim and Tarım (2014, p. 18) suggest that the elimination of local geographical terms, the slow disappearance and the terms not being passed down to future generations should be addressed, and, if necessary, each area should be investigated separately with the required attention. When we read the expressions used by the participants aged 75 years and older to three people, between 32 and 39 years old living in the region, they answered as follows: Yes, I have heard these words (S6), it's true (S6), I remember (S8), OK (S7), I've never heard this (S6) but we don't really use it (S6) and We mostly use the Internet (S8). Responses such as not hearing, just remembering, and not really using them make it difficult to transfer this knowledge to future generations. By understanding the importance of this transfer, geography educators can orient students in the right directions to discover geographical knowledge about the observations and lives of the elderly. In this context, students can travel to different regions, be introduced to elderly people and experience their daily lives first hand. It is perfectly feasible that we can teach, to younger generations, how the elderly people apply geographical knowledge to their daily lives. Experiencing first hand, students can observe how geographical location and related elements change the lives of similar people in the different regions of Turkey.

Education, regarding concepts, which are rarely used (e.g. *tail star*, *Morning Star* and *Carriage Devastating Star*) and are actually misconceived terms, is entirely possible by teaching 'the difference between the stars and the planets' through a long education and training process. However, correcting the misuse of the term may be possible in a shorter period, and with simpler methods. For example, *Keban Dam Reservoir Ferry Port* could be written instead of *Ferry Port* on traffic and informational

signs frequently used by locals. Although this technique would not change the present situation immediately, it might spread the concept of *dam reservoir* instead of *sea* after a certain period of time (Hewson & Hewson, 1984; Wang & Andre, 1991).

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